STATE OF MAINE

DEPARTMENT OF MARINE RESOURCES

IN THE MATTER OF THE APPLICATION OF)	
ERIC MORAN FOR A LIMITED-PURPOSE) FINDINGS OF FACT,
AQUACULTURE LEASE LOCATED IN SMITH)	CONCLUSIONS OF LAW
COVE, BROOKSVILLE, HANCOCK COUNTY,)	AND DECISION
MAINE)

On February 28, 2002, Eric Moran of Verona Island, Maine applied for a limited-purpose (experimental) commercial type, aquaculture lease totaling 1.997 acres in the coastal waters of the State of Maine, located in Smith Cove, in Brooksville, Hancock County, Maine. The applicant requested the lease for a term of three (3) years for the purpose of cultivating blue mussels (Mytilus edulis), American oysters (Crassostrea virginica), soft shell clams (Mya Arenaria), and surf clams (Spisula Solidissima) using suspended culture techniques. The application was accepted as complete on October 24, 2002. A public hearing on this application was held on July 9, 2003 at 1:00 p.m. in Castine. Intervenor status was granted to the Wetlands Foundation, represented by Sally Mills (hereafter referred to as Intervenor Mills), Conservation Law Foundation (hereafter referred to as CLF), represented by Roger Fleming (hereafter referred to as Intervenor Fleming), James Modisette (hereafter referred to as Intervenor Modisette), and the Town of Brooksville, represented by Robert Vaughan (hereafter referred to as Intervenor Vaughan).

Approval of limited-purpose aquaculture leases is governed by 12 M.R.S.A. §6072-A. This statute provides that a limited-purpose lease may be granted by the Commissioner of the Department of Marine Resources (DMR) if it is determined that the project will not unreasonably interfere with the ingress and egress of riparian owners; navigation; fishing or other uses of the area, taking into consideration the number and density of aquaculture leases; the ability of the site and surrounding areas to support ecologically significant flora and fauna; or the use or enjoyment within 1,000 feet of municipally, state or federally owned beaches, parks, or docking

facilities. The Commissioner must also determine that the applicant has demonstrated that there is an available source of organisms to be cultured for the lease site.

Evidence Introduced Concerning the Nature

and Impact of the Proposed Lease

The evidentiary record before the Department regarding this lease application includes the Department file (Exhibit 1), including the application (Exhibit 2) and the Department site report (Exhibit 3), and the record of the July 9, 2003 public hearing. At the public hearing, testimony was given by the applicant, Eric Moran, the Department's Aquaculture Environmental Coordinator, Jon Lewis, Intervenor Mills, Intervenor Fleming, Intervenor Modisette, Intervenor Vaughan, representatives of the Town of Castine, representatives of Maine Maritime Academy, and six members of the public.

According to the application and the testimony by the applicant, the proposed experimental lease is sought to determine the commercial viability of raising blue mussels, American oysters, soft shell clams and surf clams. The applicant requested a lease site totaling 1.997 acres and a lease term of three (3) years. The applicant testified, however, that the coordinates and metes and bounds description of the lease site contained in the Department's site report are correct and that the actual acreage of the proposed lease site is 1.993 acres.

The applicant testified that he intends to conduct mussel raft aquaculture on the proposed lease site on up to four 40 ft. x 40 ft. mussel rafts. Each raft would have 450 dropper ropes that are 45' long with 9" pegs every foot and a plastic cement-filled weight case on the end. The rafts would be secured with four 5-ton granite moorings and there would be predator nets hung around the perimeter of the rafts to keep out the eider ducks. According to the applicant, the nets would be periodically air dried to remove fouling. The applicant testified that seeding of the mussel rafts would occur in the spring or fall and harvesting would occur approximately one year after seeding. According to the applicant, seeding and harvesting may be conducted on Great Eastern Mussel Farm's barge. The applicant testified that seeding the rafts would consist of feeding the seed mussels through a machine on the barge that wraps the

seed in biodegradable cotton on the dropper ropes. Harvesting involves lifting the ropes with a crane and basket and would occur approximately 2-3 days per week for a total of 5 days per raft. In addition to the mussel rafts, the applicant also intends to grow American oysters, soft shell clams and surf clams in two rows of floating ADPI bags that will be tied to each side of the raft structure. The applicant testified that the lease area would be marked with corner buoys containing radar reflectors and reflective tape. The proposed lease site would be accessed by one of the public landings in the area. According to the applicant, all seed shellfish would be obtained from Maine hatcheries, such as Pemaquid Oyster Company in Bremen or Sandy Cove hatchery in Harrington.

In accordance with Department regulations, Chapter 2.64(2), the applicant provided an environmental characterization of the proposed lease area. According to the application, the bottom at the proposed lease site consists of sticky mud. The depths are estimated to be 58 feet at low water and 70 feet at high water. The current flow is estimated to be 1/3 knot and flows in a northwest/southeast direction. Resident flora and fauna observed using an underwater camera at the proposed lease site on June 26, 2002 consisted of rare kelp and common mud shrimp and wry mouth eel holes. According to the applicant, the mussels are filter feeders so no feed will be added and mussel feces will be well-dispersed by the tide.

According to the application, the proposed lease activities would have very little impact on the existing uses of Smith Cove. According to the applicant, the lobster fishing in the area occurs closer to shore, and there is recreational boating in the area in the summer. The applicant provided a written statement by Marine Patrol Officer Dale Sprowl regarding the existing uses of the proposed lease site. M.P.O. Sprowl stated that he is familiar with the area of the proposed site and that there is lobster fishing activity and minimal scallop and sea urchin fishing. According to M.P.O. Sprowl, there is a tremendous amount of recreational boating activity in the area by boats of various sizes. Additionally, M.P.O. Sprowl stated that Maine Maritime Academy uses the area and moors a barge and research vessel in close proximity to the proposed lease area. The applicant testified that he observed the cove for six hours on July

5, 2003 and observed 2 Boston Whalers enter Smith Cove. He also testified that he has never observed the Wednesday night racing series, the Maine Maritime Academy sail training and racing or the high school sail training and racing in Smith Cove.

Two witnesses testified on behalf of the applicant. Mark Honey, local historian, testified regarding the historical uses of Smith Cove. Hugh Cowperthwaite, from Coastal Enterprises, Inc., testified in support of the application.

The Department's Aquaculture Environmental Coordinator (AEC) conducted a site visit at the proposed lease area on April 8, 2003. During the site visit, a survey, utilizing SCUBA and an underwater video camera, was performed. The AEC created a site report summarizing the information obtained during the site visit and provided testimony regarding the site report at the public hearing. According to the report and the AEC's testimony, the proposed site is located at the head of a deep-water channel. Topography of the site is barren soft mud bottom with a deep hole at the southern end of approximately 58' depth at mean low water (MLW).

According to the AEC, three moorings were observed in Smith Cove during the site visit. One mooring, designated for the Maine Maritime Academy vessel Argo, is located approximately 603 feet north of the proposed lease site. A second, unidentified mooring is located approximately 572 feet northeast of the proposed site. The third mooring, designated Marine Resources, is located approximately 1,185 feet north of the proposed lease site. According to the AEC, the proposed lease activities are not likely to interfere with access to the three moorings. The AEC noted that Smith Cove is a sheltered location and additional moorings are expected during the summer months. He also noted that Smith Cove is an ideal location for storm anchorage and that the location of the proposed lease at the center of the deep-water channel may limit the ability of larger vessels to traverse into and anchor within the cove. According to the AEC, the proposed location of the rafts at the head of the channel may minimize the impact.

According to the AEC, the proposed activities may pose a navigable hazard. The proposed lease is located in the center of a deep-water channel that dead-ends in the proposed

lease area. According to the site report, there remains approximately 60-100 feet of deep-water channel to the west and 200-260 feet of deep-water channel to the east of the proposed site. Also according to the report, there is approximately 800-1,000 feet of navigable waters ranging in depth from approximately 10-60 feet (MLW) surrounding the proposed lease area. The AEC testified that Smith Cove is expected to have a large amount of recreational boat traffic during the summer months, consisting of canoes, kayaks, powerboats and sailboats. Maine Maritime Academy also uses the cove for sail training and recreational purposes. According to the AEC, the proposed lease site may pose a navigable hazard for sailboats using Smith Cove, depending on the size of the vessel, the skill of the captain and the familiarity with the waters. The AEC testified that he recognizes that April 8th is not an ideal time to assess the boating activity in Smith Cove, and that he defers to the Harbormasters and people from the area regarding the extent of the activity in Smith Cove.

According to the site report, no fishing activity was observed within Smith Cove during the site visit and no commercially viable populations of fish or shellfish were observed during the SCUBA survey. The AEC recognized that the site visit occurred early in the season and that lobster fishing may occur within Smith Cove in the summer months. Approximately 816 feet to the southwest of the proposed lease site is a ledge that is expected to provide good habitat for lobsters and other commercially viable species. According to the AEC, the proposed activities would not interfere with fishing around this ledge. According to the AEC, the nearest aquaculture lease is located approximately 1.95 miles to the northeast of the proposed site in the Bagaduce River.

Local flora and fauna observed during the site survey consisted of an abundance of brown benthic diatoms, worm castings and sand shrimp in the northern 75% of the proposed site. Lobster burrows and crabs were also commonly observed in this portion of the proposed site. The southern 25% of the proposed lease area occupies a deep hole. Flora and fauna observed in this area during the site survey consisted of an abundance of mysid shrimp, a patchy distribution of sea stars, crabs, sea cucumbers, frilled anemones, and northern red

anemones, dulse, rockweed, kelp, sea lettuce, green fleece and a single toad crab. According to the site report, mussel drop-off from the proposed rafts is expected to result on an accumulation of mussels, resulting in an increase in sea stars and crabs.

According to the AEC's report the proposed lease is located in an area classified as conditionally approved for the harvest of shellfish by the Department's Water Quality Division, due to the Castine wastewater treatment plant. Any malfunction in plant operations results in an automatic closure of Smith Cove for a minimum of two weeks. Also, according to the site report the proposed lease site is not located in an "Essential or Significant Wildlife Habitat" regulated by the Department of Inland Fisheries and Wildlife (IF&W).

Two representatives from the Town of Castine testified at the hearing. Selectman Kenneth Eaton, owner of Eaton's Boatyard, testified regarding his knowledge of Smith Cove in his 35 years of observations. According to Mr. Eaton, the three selectmen from the Town of Castine oppose the proposed lease. Mr. Eaton testified that Smith Cove is a known hurricane hole and that boats come to Smith Cove from as far as Rhode Island for protection. As part of his business, Mr. Eaton hosts yacht clubs that visit the area for an overnight stay in Smith Cove. Mr. Eaton testified that he has observed large sailboats and schooners use Smith Cove for anchorage. According to Mr. Eaton, the large vessels enter Smith Cove through the main channel and anchor in the cove, outside of the channel. He testified that he has observed up to eight or ten windjammers in the cove at one time. Mr. Eaton testified that on a good day, a vessel should be able to get by the proposed lease. However, according to Mr. Eaton, the proposed lease site would be a safety hazard, particularly in the nighttime and in foggy conditions. According to Mr. Eaton there are inexperienced people who do enter Smith Cove during the night and in foggy conditions.

Castine Harbormaster, George Plender, also provided testimony at the hearing in opposition to the proposed lease. Mr. Plender testified that he sends boats into Smith Cove that are looking for anchor, some of which have never been there before. He testified that he has observed boats in excess of 150 feet use Smith Cove for anchorage. Mr. Plender testified that

the public uses Smith Cove for small crafts and that the Castine Yacht Club runs race series in Smith Cove every Wednesday night. Mr. Plender drew an outline of the triangle course used in the Wednesday evening race series on the chart depicting Smith Cove. According to Mr. Plender's drawing, the course runs through the proposed lease area. Mr. Plender testified that the races are held in Smith Cove in order to be out of the strong river current. According to Mr. Plender, he is concerned with the effect of the proposed lease site on navigation. Mr. Plender testified that he sends boats down the main channel to access Smith Cove and that boats with a 15 or 16-foot draft need to navigate in the deep water where the proposed lease site is located. Mr. Plender noted that boats that are anchored in Smith Cove can be seen at night because they have mooring lights.

Two employees of Maine Maritime Academy, (hereafter referred to as MMA), testified at the hearing in opposition to the proposed lease. Jeff Loustaunau, Port Captain for MMA, testified that he is responsible for school programs on the waterfront, including varsity sailing, sail training, lifeboat training, recreational sailing and physical education. According to Mr. Loustaunau, the programs occur in the fall and spring and involve approximately 200 students, that he referred to as "student drivers." He testified that the school has a limited time in which to complete the required training, which is essential to half of the students in order to get an Unlimited Coastguard License. According to Mr. Loustaunau, they have to use the protected waters in Smith Cove in order conduct the training safely. He testified that MMA also provides the boats for the Castine Yacht Club's Wednesday evening race series. Mr. Loustaunau testified that the proposed lease would be a navigational hazard for the students training in Smith Cove. He testified that the students in the lifeboat training do not have sails and have difficulty avoiding boats. Mr. Loustaunau also testified that the sailing programs have been in existence at MMA since the 1960's.

Frederick "Butch" Minson also testified on behalf of MMA in opposition to the proposed lease. Mr. Minson testified that he has been the coach for the varsity sailing program at MMA for eight years and he also teaches physical education. He testified that two-thirds of the physical

education class have never been in a sailboat, and the best place for them to learn is in Smith Cove due to the strong current in the river and the protected water in the cove. With regard to the varsity sailing program, the practices and regattas are also held in Smith Cove, due to the strong river currents outside the cove. The regattas are held in the fall and are usually held on 2-5 days, all day, Saturday or Sunday. According to Mr. Minson, the courses for the regattas are bounded by Henry Point and Henry Island to the east and Red Nun #2 and Hospital Island to the west. He testified that the starting point is located in the center of the boundaries and the triangle course is then oriented in the direction the wind is blowing. Mr. Minson drew the estimated location of the starting point on the chart depicting Smith Cove. The starting point on the chart is located between the proposed lease site and Henry Island. The prevailing wind in September, according to Mr. Minson, puts the course of the regatta straight through the proposed lease site. Mr. Minson testified that his concern with the proposed lease site in the fall is the interference with the regattas and the hazard to new students that have difficulty controlling the boats. In the spring, Mr. Minson is also concerned with the cold water temperatures and uses Smith Cove's calm waters to minimize capsizing. Another reason Mr. Minson noted for using that location in Smith Cove for the regattas is that it is close enough to shore to allow the students to get to shore in between divisions. Mr. Minson also testified that he has been using Smith Cove for the practices, classes and regattas for eight years. As a sailor, not speaking of the regattas, Mr. Minson testified that a small sailboat would be able to get around the proposed lease in good weather, but it is the low profile of the rafts and the lack of radar in many boats that cause the navigational difficulty.

Intervenor Mills testified at the hearing. She testified on behalf of the Wetlands Foundation, which owns three parcels of land, totaling approximately 200 acres in Brooksvile, a portion of which is in close proximity to the proposed lease area. Intervenor Mills testified that the relationship between the applicant and Great Eastern Mussel Farm constitutes a partnership and, therefore, Great Eastern Mussel Farm should have been included in the lease application and should be named on any lease issued. Additionally, Intervenor Mills testified that the

Wetlands Foundation is concerned with the effect of the proposed lease on navigation and the character of Smith Cove.

Intervenor Fleming provided written (exhibit 24) and oral testimony. He testified that the proposed lease activities would unreasonably interfere with navigation and the use of the cove as a harbor of refuge. Mr. Fleming testified that he interviewed Windjammer captains who stated that they use Smith Cove because of the good holding bottom and protection from the wind. According to Mr. Fleming, the Windjammer captains stated that it would be difficult to enter the cove with the proposed lease site located in the middle of the channel. In an email to CLF from Kip Files, Captain of the Schooner Victory Chimes, Captain Files states that if the rafts are placed in the proposed lease area, he would not be able to navigate it under sail. (Exhibit CLF 3). According to Mr. Fleming, every boater interviewed by CLF knows that Smith Cove is a safe harbor in the event of a storm or hurricane and the proposed lease site would put boats at risk during a storm or in the fog.

Intervenor Modisette provided testimony at the hearing. He testified that he is the advisor to a local high school sailing team. He testified that the proposed lease activities would interfere with sail training and racing that has traditionally taken place at the proposed lease area. According to Mr. Modisette, for the past five years the high school has hosted a regatta every May in Smith Cove, called the Downeast Fleet Racing Championship. Mr. Modisette testified that the course is oriented based upon the wind and an obstruction in the course changes what happens in that race. Mr. Modissete introduced photographs taken on May 17, 2003 during the regatta. (Exhibits 49). The photographs show the sailboats in the race sailing next to and in between the buoys marking the proposed lease site. Mr. Modisette also testified that the high school practices sailing in Smith Cove and that there are some students who have never been in a sailboat, practicing in Smith Cove.

Intervenor Vaughan also testified at the hearing on behalf of the Town of Brooksville. He testified that the proposed site is a navigational hazard because it is in the middle of a deepwater channel between Smith Cove and Castine Harbor, and that Smith Cove provides

anchorage for large vessels and is a well-known hurricane hole. Mr. Vaughan also testified regarding two specific instances in which the proposed lease would create a navigational hazard. He testified that the lease site would pose a hazard to an 80-foot schooner under the best of conditions, that must tack through to access Smith Cove, and a Boston Whaler entering the cove in the dark who will be unable to see the rafts.

Ross Files, Brooksville Harbormaster, provided written comments regarding the application. He stated that the proposed lease activities would interfere with navigation and traditional storm anchorages. Mr. Files stated that the proposed site is right in the middle of the deep-water channel and will most likely interfere somewhat with boats entering or exiting Smith Cove. He also stated that the area is a well-known storm anchorage and that the proposed lease will interfere with anchorage. He indicated that lobster, scallop and sea urchin fishing occur in the proposed lease area, and that there is a tremendous amount of boating activity in the area.

Six members of the public also provided testimony at the hearing. Local residents David Bicks, Robert Scott and Deborah Evans provide testimony regarding the uses of Smith Cove. Mr. Bicks testified that he has been sailing in Castine and running races for 37 years. According to Mr. Bicks, because of the river current in Castine, boats must anchor in Smith Cove and sailing races must be held in Smith Cove. Mr. Bicks testified regarding the Castine Yacht Club's community sail program and the Wednesday night race series. He testified that very frequently the course runs over the proposed lease site. According to Mr. Bicks, the proposed lease site would not create a navigational hazard for a power boat in clear weather. However, Mr. Bicks testified that in bad weather, in races or in a schooner, the proposed site is a hazard. Mr. Scott testified that he obtained the track of a GPS from a 50-foot schooner that tacked through Smith Cove on July 8, 2003. Mr. Scott testified that it was fair weather that day and he provided a tracing of the tack that he obtained. (Exhibit 20). The tracing shows that the schooner tacked through the proposed lease area. Ms. Evans testified regarding her observations of the activity on Smith Cove by large vessels and the use of Smith Cove as a hurricane hole. Patrick Hogan

of the Castine Patriot submitted a newspaper article regarding conditional approval areas. (Exhibit 21). Sherman Hutchins testified in support of aquaculture as providing work for fishermen. Maggie Williams testified regarding her concerns with the impact of the lease on navigation and ecology. In addition, several written comments were submitted by members of the public regarding the proposed lease.

Findings of Fact

The proposed lease is located in the deep-water navigational channel in Smith Cove. There is a large amount of vessel traffic in Smith Cove because it provides a protected location in which to anchor. Large vessels, including schooners, anchor in Smith Cove. Schooners under sail have to tack through Smith Cove to enter the cove for anchorage and would have difficulty avoiding the proposed lease site. Smith Cove is also a well-know hurricane hole and vessels come long distances to seek protection in the cove. Although a powerboat, in clear conditions, may be able to navigate around the proposed lease site, there is a substantial amount of evidence in the record that indicates that vessels frequently enter Smith Cove at night and in bad weather. It is under such conditions that the proposed lease site would pose a dangerous hazard to navigation. In addition, there is a substantial amount of vessel traffic by MMA students with little navigational experience. Based on the foregoing, I find that the proposed lease will unreasonably interfere with navigation.

For many years Smith Cove has been used by MMA for sail training and racing, recreational sailing, and physical education courses, by the Castine Yacht Club for weekly sailing race series, and by the local high school for the Downeast Fleet Racing Championship. The courses for the races are oriented in the direction the wind is blowing. Frequently, due to the prevailing winds in the cove, the races run through the proposed lease area. The proposed lease area would interfere with the running of these races. Therefore, I find that the proposed lease will unreasonably interfere with other uses of the area.

Conclusions of Law

Based on the above findings, I conclude that:

1. The aquaculture ætivities proposed for this site will unreasonably interfere with navigation and other uses of the area.

Therefore, the evidence in the record does not support a finding that the proposed aquaculture activities meet the requirements for the granting of an aquaculture lease set forth in 12 M.R.S.A. §6072-A.

Decision

Based on the foregoing, the application for a limited-purpose commercial lease of 1.993 acres in Smith Cove, Brooksville, is denied.

Dated:	
	George D. Lapointe (Commissioner)
	Department of Marine Resources